

1.4 Exercises

Extra Practice, page 716

#3

#5-26

all

GUIDED PRACTICE

- Why is it important to learn to communicate mathematics? Give a real-life example of communicating mathematics.
- State the established order of operations. Why is it important to have an established order of operations?
- Evaluate the expression.
 - $18 - 4 \times 3$
 - $48 \div 6 \times 3$
 - $12 + 4^2 - 3 \times (5 - 2)$
- REASONING** Copy the number sentence and insert parentheses to make it true.
 - $4 \div 2 \times 8 + 2 = 20$
 - $3 \times 4 + 8 - 2 = 34$

PRACTICE AND PROBLEM SOLVING

In Exercises 5–18, simplify the expression without using a calculator.

- $7 + 12 \div 6$
- $12 - 3 \times 4$
- $5 \cdot 3 + 2^2$
- $5^2 - 8 \div 2$
- $11 + 4 \div 2 \times 9$
- $21 - 1 \cdot 2 \div 4$
- $14 - 8 + 4 \cdot 2^3$
- $3^3 - 8 \cdot 3 \div 12$
- $(9 + 7) \div 4 \times 2$
- $6 \div (17 - 11) \cdot 14$
- $4 - 5(5) + 13$
- $16 \div 4 \cdot 2 - 7$
- $3[16 - (3 + 7) \div 5]$
- $(6 + 32)(4 - 2)$

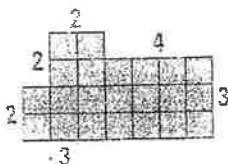


In Exercises 19–26, simplify the expression. You may want to use a calculator for some of the exercises.

- $29 + 16 \div 8 \cdot 25$
- $36 + 16 - 50 \div 25$
- $18 \cdot 3 \div 3^3$
- $10 + 5^3 - 25$
- $20 - (3^2 \div 27) \cdot 2$
- $149 - (2^8 - 40) \div 6$
- $22 + (34 \cdot 2)^2 \div 8$
- $85 - (4 \cdot 2)^2 - 3$

GEOMETRY In Exercises 27 and 28, write an expression that represents the area of the region. Then simplify the expression.

27.



28.

